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2292 7590 06/29/2007 BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALLS CHURCH, VA 22040-0747			EXAMINER RASHID, DAVID	
			ART UNIT 2624	PAPER NUMBER
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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<b>Office Action Summary</b>	<b>Application No.</b> 10/765,963	<b>Applicant(s)</b> SHIOTA ET AL.	
	<b>Examiner</b> David P. Rashid	<b>Art Unit</b> 2624	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 1/29/2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 29 January 2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date: _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>3/31/2004, 5/5/2006</u> | 6) <input type="checkbox"/> Other: _____  |

### **DETAILED ACTION**

All of the examiner's suggestions presented herein below have been assumed for examination purposes, unless otherwise noted.

#### ***Amendments***

1. This office action is responsive to the preliminary claim amendment received on 1/29/2004.

#### ***Priority***

2. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d) (Application # JP2003-023901, filed 1/29/2004), which papers have been placed of record in the file.

#### ***Drawings***

3. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(4) because reference character "S5" has been used to designate both a photographic image in FIG. 2 and step in FIG. 3.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will

Art Unit: 2624

be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

***Claim Rejections - 35 USC § 101***

4. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

The USPTO "Interim Guidelines for Examination of Patent Applications for Patent Subject Matter Eligibility" (Official Gazette notice of 22 November 2005), Annex IV, reads as follows:

Descriptive material can be characterized as either "functional descriptive material" or "nonfunctional descriptive material." In this context, "functional descriptive material" consists of data structures and computer programs which impart functionality when employed as a computer component. (The definition of "data structure" is "a physical or logical relationship among data elements, designed to support specific data manipulation functions." The New IEEE Standard Dictionary of Electrical and Electronics Terms 308 (5th ed. 1993).) "Nonfunctional descriptive material" includes but is not limited to music, literary works and a compilation or mere arrangement of data.

When functional descriptive material is recorded on some computer-readable medium it becomes structurally and functionally interrelated to the medium and will be statutory in most cases since use of technology permits the function of the descriptive material to be realized. Compare *In re Lowry*, 32 F.3d 1579, 1583-84, 32 USPQ2d 1031, 1035 (Fed. Cir. 1994) (claim to data structure stored on a computer readable medium that increases computer efficiency held statutory) and *Warmerdam*, 33 F.3d at 1360-61, 31 USPQ2d at 1759 (claim to computer having a specific data structure stored in memory held statutory product-by-process claim) with *Warmerdam*, 33 F.3d at 1361, 31 USPQ2d at 1760 (claim to a data structure per se held nonstatutory).

In contrast, a claimed computer-readable medium encoded with a computer program is a computer element which defines structural and functional interrelationships between the computer program and the rest of the computer which permit the computer program's functionality to be realized, and is thus statutory. See *Lowry*, 32 F.3d at 1583-84, 32 USPQ2d at 1035.

5. **Claim 17** is rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter as follows. Claim 17 defines "[a] program that causes a computer to execute selection of photographic images..." embodying functional descriptive material. However, the claim does not define a computer-readable medium or memory and is thus non-statutory for that reason (i.e., "When functional descriptive material is recorded on some

Art Unit: 2624

computer-readable medium it becomes structurally and functionally interrelated to the medium and will be statutory in most cases since use of technology permits the function of the descriptive material to be realized” – Guidelines Annex IV). That is, the scope of the presently claimed “program that causes a computer to execute selection of photographic images...” can range from paper on which the program is written, to a program simply contemplated and memorized by a person. The examiner suggests amending the claim to embody the program on “computer-readable medium” or equivalent in order to make the claim statutory. Any amendment to the claim should be commensurate with its corresponding disclosure.

***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(a) the invention was known or used by others in this country, or patented or described in a printed publication in this or a foreign country, before the invention thereof by the applicant for a patent.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

7. **Claims 1, 2, 3, 4, 13, 14, 15, 17, and 18** is rejected under 35 U.S.C. 102(b) as being anticipated by Kowald (US 2003/0002715 A1)

Regarding **claim 1**, Kowald discloses a photographic image (“photographer...capturing the image or image sequence.” in paragraph [0037]) selecting apparatus (FIG. 5) comprising:

Art Unit: 2624

a classifying means (FIG. 5, elements 522, 524; FIG. 6, element 601) for classifying a plurality of photographic images into similar photographic image groups (“[t]he visual language classification system 522 outputs classification data 524, configured as further metadata, which is associated with each image...” in paragraph [0036]; “features including landscape features...or other particular shapes...” in paragraph [0037]; “time code and date data” in paragraph [0051]), comprising photographic images which are similar to each other (photographic images in a video stream are “similar” to each other), the similarities being determined by analyzing (“content analysis to analyse the images residing in the store 510.”, in paragraph [0037]) digital data (“digital video” in paragraph [0035]) representing the photographic images;

a qualified photographic image extracting means (FIG. 5, element 514; FIG. 6, element 616) for extracting (“editing system 514 which extracts the appropriate images or sequence of images from the store 510.” in paragraph [0047]; paragraph [0048] for an example of “images that have been previously classified as a long shot.”) photographic images, that satisfy predetermined selection conditions (paragraph [0050]; “sharpness, colour, content quality” in paragraph [0053]) as qualified photographic images (those images classified under a certain characteristic in memory 526 will be identified for editing in video editing system 514), from each of the similar photographic image groups (Each frame/image is tagged with metadata including all identified characteristics of that particular frame. All frames/images with a particular metadata tag (e.g. exposure amount) is a group, and it is possible for each frame/image to belong to multiple groups. Hence, each of the similar photographic image groups will be

Art Unit: 2624

extracted in the editing system 514 when all images are searched for a particular metadata characteristic.); and

a differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) for differentiating the qualified photographic images from the other photographic images (those images classified under a certain characteristic in memory 526 will be identified for editing in video editing system 514 is “differentiating” those images classified under a certain characteristic from the rest) and administering processes thereon (those images classified under a certain characteristic are then open for editing in system 514, and thus “administering processes thereon”).

Regarding **claim 2**, Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the predetermined selection conditions include image quality levels (“image quality analysis” in paragraph [0053]).

Regarding **claim 3**, Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the qualified photographic image extracting means (FIG. 5, element 514; FIG. 6, element 616) is equipped with a selection condition setting means (paragraphs [0047], [0048]); and

the selection condition setting means is capable of setting the selection conditions for each similar photographic image group (through programming (paragraph [0062]), the selection condition setting means is “capable” of setting the selection conditions for each similar photographic image group, whether Kowald teaches it or not).

Regarding **claim 4**, claim 3 recites identical features as in claim 4. Thus, references/arguments equivalent to those presented above for claim 3 are equally applicable to claim 4.

Regarding **claim 13**, Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) performs processes wherein the qualified photographic images and the other photographic images are differentiated (paragraph [0047]), then recorded in a recording medium (FIG. 5, element 519; paragraph [0036]).

Regarding **claim 14**, Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) performs processes wherein only the qualified photographic images are recorded (from paragraph [0036], the video editing system 514 grabs only the frames/images from database 510 that pertain to metadata characteristics stored in database 526 to be further processed in elements 516, 518, 519) in a recording medium (FIG. 5, element 519; paragraph [0036]).

Regarding **claim 15**, Kowald discloses the photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) is a display means (FIG. 5, element 518); and



Art Unit: 2624

only the qualified photographic images are displayed (from paragraph [0036], the video editing system 514 grabs only the frames/images from database 510 that pertain to metadata characteristics stored in database 526 to be further processed in elements 516, 518, 519) thereby.

Regarding **claim 17**, claim 1 recites identical features as in the program that causes a computer to execute selection of photographic images (paragraph [0062]) of claim 17. Thus, references/arguments equivalent to those presented above for claim 1 are equally applicable to claim 17.

Regarding **claim 18**, claim 1 recites identical features as in the computer readable medium having recorded therein a program that causes a computer to execute selection of photographic images (FIG. 6; paragraph [0062]) of claim 18. Thus, references/arguments equivalent to those presented above for claim 1 are equally applicable to claim 18.

### ***Claim Rejections - 35 USC § 103***

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. **Claim 5, 6, 9 and 10** are rejected under 35 U.S.C. 103(a) as being unpatentable over Kowald (US 2003/0002715 A1) in view of Bhatt (US 2002/0118883 A1).

Regarding **claim 5**, while Kowald discloses a photographic image selecting apparatus as defined in claim 3, Kowald does not teach wherein the selection condition setting means sets the

Art Unit: 2624

selection conditions so that at least one qualified photographic image is extracted from each of the similar photographic image groups.

Bhatt discloses a classifier-based enhancement of digital image (FIG. 5) wherein a selection condition setting means sets the selection conditions (FIG. 5, elements 40, 45, 50, 65, 55) so that at least one qualified photographic image (paragraph [0032]; FIG. 5, element 20, “photo quality” in paragraph [0008]) is extracted (“Each image after enhancement goes through a file size check in element 45.” in paragraph [0032]; paragraph [0032]) from each of the similar photographic image groups (“Image Enhance GROUP 1” through “Image Enhance GROUP N” in FIG. 5).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the selection condition setting means of Kowald to include setting the selection conditions so that at least one qualified photographic image is extracted from each of the similar photographic image groups as taught by Bhatt “...to provide a novel automated method with minimal manual interactions to enhance the images from diverse sources.”, Bhatt, paragraph [0009].

Regarding **claim 6**, claim 5 recites identical features as in claim 6. Thus, references/arguments equivalent to those presented above for claim 5 are equally applicable to claim 6.

Regarding **claim 9**, while Kowald discloses a photographic image selecting apparatus as defined in claim 3, Kowald does not disclose wherein the selection condition setting means sets the selection conditions according to a specified number of qualified photographic images to be extracted from each of the similar photographic image groups.

Art Unit: 2624

Bhatt discloses a classifier-based enhancement of digital image (FIG. 5) wherein a selection condition setting means (FIG. 5, elements 40, 45, 50, 65, 55) sets the selection conditions (FIG. 5, element 65; “parameters” in paragraph [0032]; paragraph [0032]) according to a specified number (the specified number is all images in each Image Enhance GROUP, whatever that number may be) of qualified photographic images (paragraph [0032]; FIG. 5, element 20, “photo quality” in paragraph [0008]) to be extracted from each of the similar photographic image groups (“Image Enhance GROUP 1” through “Image Enhance GROUP N” in FIG. 5).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the selection condition setting means of Kowald to include setting the selection conditions according to a specified number of qualified photographic images to be extracted from each of the similar photographic image groups as taught by Bhatt “...to provide a novel automated method with minimal manual interactions to enhance the images from diverse sources.”, Bhatt, paragraph [0009].

Regarding **claim 10**, claim 9 recites identical features as in claim 10. Thus, references/arguments equivalent to those presented above for claim 9 are equally applicable to claim 10.

10. **Claims 7 and 8** are rejected under 35 U.S.C. 103(a) as being unpatentable over Kowald (US 2003/0002715 A1) in view of Florance et al. (US 2002/0065739 A1) and Kowald (US 2003/0002715 A1).

Regarding **claim 7**, while Kowald discloses a photographic image selecting apparatus as defined in claim 3, Kowald does not teach wherein the selection condition setting means sets the selection conditions to be stricter for similar photographic image groups having a greater number of photographic images included therein.

Florance discloses a system and method for collection, distribution, and use of information in connection with commercial real estate (FIG. 1) wherein a selection condition setting means (paragraph [0076]) sets the selection conditions to be stricter for similar document groups having a greater number of documents included therein (paragraph [0077]).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to set the selection condition setting means of Kowald to be stricter for similar document groups having a greater number of documents included therein as taught by Florance "...to narrow the scope of the user's search...", Florance, paragraph [0077].

Kowald discloses wherein the documents are photographic images ("photographer...capturing the image or image sequence." in paragraph [0037]).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the documents of Kowald in view of Florance to be photographic images as taught by Kowald for "...the automated classification of images and/or shots into various emotive categories thereby permitting editing to achieve a desired emotive effect.", Kowald, paragraph [0016].

Regarding **claim 8**, claim 7 recites identical features as in claim 8. Thus, references/arguments equivalent to those presented above for claim 7 are equally applicable to claim 8.

11. **Claim 11** is rejected under 35 U.S.C. 103(a) as being unpatentable over Kowald (US 2003/0002715 A1) in view of Kowald (US 2003/0002715 A1).

Regarding **claim 11**, while Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) performs processes wherein only the qualified photographic images (from paragraph [0036], the video editing system 514 grabs only the frames/images from database 510 that pertain to metadata characteristics stored in database 526 to be further processed in elements 516, 518, 519) are processed (FIG. 5, elements 518, 519), Kowald does not teach wherein that processing is printing.

Kowald teaches a printer (FIG. 6, element 615) connected to the photographic image selecting apparatus (FIG. 6, element 601).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the differentiating and processing means of Kowald to include a printer as taught by Kowald for "...the automated classification of images and/or shots into various emotive categories thereby permitting editing to achieve a desired emotive effect.", Kowald, paragraph [0016].

12. **Claim 12** is rejected under 35 U.S.C. 103(a) as being unpatentable over Kowald (US 2003/0002715 A1) in view of Kowald (US 2003/0002715 A1) and Sano (US 6,079,885 A).

Regarding **claim 12**, while Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means performs process wherein the qualified photographic images and the other photographic images are processed (If two metadata characteristics are extracted from video editing system 514, groups A and B are formed – slides with characteristics of one metadata (group A) and slides with characteristics of the other metadata (group B). All slides with both metadata characteristics are processed (groups A and B), and if group A is the “qualified photographic images” with respect to one metadata characteristic, then group B would be the “other photographic images”). Kowald does not teach wherein the process is (i) printing (ii) in different sizes.

Kowald teaches a printer (FIG. 6, element 615) connected to the photographic image selecting apparatus (FIG. 6, element 601).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the differentiating and processing means of Kowald to include a printer for printing as taught by Kowald for “...the automated classification of images and/or shots into various emotive categories thereby permitting editing to achieve a desired emotive effect.”, Kowald, paragraph [0016].

Sano discloses a printer with variable image processing corresponding to image size (FIG. 1) wherein photographic images (Col. 3, lines 28 - 29) are printed in different sizes (“image 1” and “image 2” in FIG. 6).

It would have been obvious to one of ordinary skill in the art at the time the invention was made for the differentiating and processing means and printer of Kowald in view of Kowald

Art Unit: 2624

to include printing the qualified photographic images and the other photographic images of Kowald in view of Kowald in different sizes as taught by Sano "...to produce high quality prints by changing the type of image processing and the amount of correction corresponding to the size of each printed image.", Sano, Col. 2, lines 3 – 5.

13. **Claim 16** is rejected under 35 U.S.C. 103(a) as being unpatentable over Kowald (US 2003/0002715 A1) in view of Tsukagoshi et al. (US 5,848,217 A).

Regarding **claim 16**, while Kowald discloses a photographic image selecting apparatus as defined in claim 1, wherein:

the differentiating and processing means (FIG. 5, elements 518, 519, 516; FIG. 6, element 616) is a slideshow display means (FIG. 5, element 518 wherein a display constitutes a "slideshow"); and

the qualified photographic images and the other photographic images (If two metadata characteristics are extracted from video editing system 514, groups A and B are formed – slides with characteristics of one metadata (group A) and slides with characteristics of the other metadata (group B). All slides with both metadata characteristics are displayed (groups A and B), and if group A is the "qualified photographic images" with respect to one metadata characteristic, then group B would be the "other photographic images".) are displayed as slides for display durations, Kowald does not teach displaying different durations.

Tsukagoshi discloses subtitle encoding/decoding method and apparatus (FIG. 1) wherein slides ("plurality of video frames" in Col. 6, lines 23 - 39) are displayed in different durations (Col. 6, lines 23 – 39 wherein subtitles are longer in time duration than the video frame).

Art Unit: 2624

It would have been obvious to one of ordinary skill in the art at the time the invention was made for slideshow display means of Kowald to display the slides at different display durations as taught by Tsukagoshi "for encoding subtitles to be played back exclusively during the trick playback mode, i.e., during fast, slow or reverse playback modes.", Tsukagoshi, Col. 2, lines 61 – 64.

### *Conclusion*

14. Any inquiry concerning this communication or earlier communications from the examiner should be directed to David P. Rashid whose telephone number is (571) 270-1578. The examiner can normally be reached Monday - Friday 8:30 - 17:00 ET.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Brian Werner can be reached on (571) 272-7401. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would



Art Unit: 2624

like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/David P. Rashid/

Examiner, Art Unit 2624

David P Rashid

Examiner

Art Unit 2624

/Brian P. Werner/

Supervisory Patent Examiner (SPE), Art Unit 2624